CLAIMS

What is claimed is:

5   1.   A method of sharing information between a host computer system and a

peripheral computer system comprising the steps of:

a) establishing a communication link between said host computer system

and said peripheral computer system;

b) activating a plurality of conduit programs on said host computer system,

10   wherein said conduit programs execute in parallel; and

c) said conduit programs simultaneously synchronizing information on said

host computer system with information on said peripheral computer system,

wherein said conduit programs time multiplex information transfers over said

communication link while they execute in parallel.

15

2.   The method of Claim 1 wherein step c) comprises the step of

c1) said plurality of conduit programs initiating multiple interleaved transfers

across said communication link.

20   3.   The method of Claim 1 further comprising the step of

d) establishing the order in which said plurality of conduit programs receive

access to said communication link.

4.   The method of Claim 3 wherein step d) comprises the step of

d1) arbitrating the order in which said plurality of conduit programs receive access to said communication link.

5.   The method of Claim 1 wherein:

5   said plurality of conduit programs comprise a first conduit program and a second conduit program; and wherein

step c) comprises the steps of:

c1) said first conduit program performing a transfer across said communication link while said second conduit program simultaneously

10   performs a non-transfer function; and

c2) said second conduit program performing a transfer across said communication link while said first conduit program simultaneously performs a non-transfer function.

15   6.   The method of Claim 1 wherein said plurality of conduit programs comprise a first conduit program and a second conduit program; and

step c) comprises the step of

c1) said first conduit program updating records in a database on said host computer system while said second conduit program simultaneously

20   performs a data transfer across said communication link.

7.   The method of Claim 1 wherein said plurality of conduit programs comprise a first conduit program and a second conduit program; and

step c) comprises the step of

c1) said first conduit program performing a data transfer across said communication link while said second conduit program simultaneously waits for a response from said peripheral computer system.

5   8.   The method of Claim 1 wherein said peripheral computer system is a palmtop computer system.

9.   A system for transferring information comprising:

a) a host computer system;

10   b) a peripheral computer system;

c) a communication link between said host computer system and said peripheral computer system;

d) a plurality of conduit programs on said host computer system, said conduit programs for synchronizing information between said host computer

15   system and said peripheral computer system; and

e) a manager program on said host computer system, said manager program for invoking said conduit programs simultaneously, wherein said conduit programs simultaneously execute to synchronize information on said host computer system with information on said peripheral computer system, and

20   wherein further said conduit programs time multiplex information transfers over said communication link while they execute simultaneously.

10.   The system of Claim 9 further comprising:

f) an ordering program on said host computer system, said ordering

25   program for ordering access to said communication link by said plurality of conduit

programs, wherein said conduit programs initiate multiple interleaved transfers across said communication link.

11.   The system of Claim 9 wherein a first of said plurality of conduit programs is
5   for synchronizing a database on said host computer system with a database on said peripheral computer system.

12.   The system of Claim 9 wherein a first of said plurality of conduit programs is for installing software onto said peripheral computer system.
10

13.   The system of Claim 9 wherein a first of said plurality of conduit programs is for exchanging e-mail between said host computer system and said peripheral computer system.

15   14.   The system of Claim 9 further comprising:

a plurality of host databases on said host computer system; and

a plurality of peripheral databases on said peripheral computer system, each of said peripheral databases corresponding to one host database, wherein said plurality of conduit programs simultaneously synchronize said host databases
20   with said peripheral databases.

15.   A method of sharing information between a host computer system and an electronic device comprising the steps of:

a) establishing a communication link between said host computer system
25   and said electronic device;

PALM 2975 US P

b) creating a conduit program database on said host computer system, said conduit program database for storing a list of conduit programs to be executed;

c) simultaneously executing a plurality of conduit programs on said host computer system, said conduit programs selected from said conduit program

5 database; and

d) said conduit programs simultaneously synchronizing information on said host computer system with associated information on said electronic device, wherein said conduit programs time multiplex information transfers over said communication link while they execute simultaneously.

10

16.   The method of Claim 15 wherein step d) comprises the step of

d1) said plurality of conduit programs initiating multiple interleaved transfers across said communication link.

15   17.   The method of Claim 15 further comprising the step of

e) establishing the order in which said plurality of conduit programs receive access to said communication link.

18.   The method of Claim 15 wherein:

20   said plurality of conduit programs comprise a first conduit program and a second conduit program; and wherein

step d) comprises the steps of:

d1) said first conduit program retrieving a first set of modified records from a first peripheral database on said peripheral computer;

d2) said second conduit program retrieving a second set of modified records from a second peripheral database on said peripheral computer while said first conduit program compares said first set of modified records with a first host database on said host computer system to create a first

5   synchronized database;

d3) said first conduit program writing first records from said first synchronized database to said first peripheral database while said second conduit program compares said second set of modified records with a second host database on said host computer system to create a second

10   synchronized database; and

d3) said second conduit program writing second records from said second synchronized database to said second peripheral database.

19.   The method of Claim 15 wherein said electronic device is a portable

15   computer system.

20.   The method of Claim 15 wherein said electronic device is a palmtop computer system.